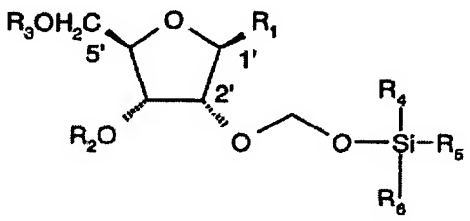
Amendments to the Claims

This listing of claims will replace all prior versions, and listings, of claims in the specification:

Listing of Claims

1. A ribonucleoside-derivative of the formula



wherein

R_1 is a base of the purine- or pyrimidine- family or a derivative of such a base or any other residue which serves as a nucleobase surrogate,

R_2 is a proton or a substituted derivative of phosphoric acid,

R_3 is a proton or a protection-group for the oxygen atom in 5'-position,

R_4, R_5 and R_6 are independently alkyl or aryl or a combination of alkyl and aryl or heteroatom, R_4, R_5 or R_6 may also be cyclically connected to each other;

and

wherein at least one of the R_4, R_5 or R_6 substituents comprises a tertiary C-atom or a heteroatom vicinal to the Si-atom.

2. A ribonucleoside-derivative according to claim 1 wherein the substituent comprising the tertiary C-atom vicinal to the Si-atom comprises from 4 to 24 C-atoms.

3. A ribonucleoside-derivative according to claim 1 ~~or 2~~ wherein the substituent comprising the tertiary C-atom vicinal to the Si-atom is an alkyl-substituent selected from the group consisting of tert-butyl, tert-pentyl, tert-hexyl, tert-heptyl, tert-octyl, tert-nonyl, tert-decyl, tert-undecyl, tert-dodecyl.

4. A ribonucleoside-derivative according to claim 1 ~~, 2 or 3~~ wherein the substituent comprising the tertiary C-atom vicinal to the Si-atom is selected from the group of 1,1-dimethyl ethyl, 1,1-dimethyl-propyl, 1,1-dimethyl-butyl, 1,1-dimethyl-pentyl, 1,1-dimethyl-hexyl, 1,1,2-

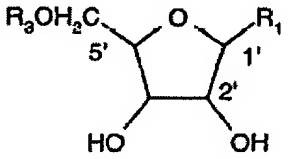
trimethyl-propyl, 1,1,2-trimethyl-butyl, 1,1,2-trimethyl-pentyl, 1,1,2-trimethyl-hexyl, 1,1,2,2 tetramethyl-propyl, 1,1,2,2-tetramethyl-butyl.

5. A ribonucleoside-derivative according to claim 1 wherein the substituent vicinal to the Si-atom comprises a substituted heteroatom.

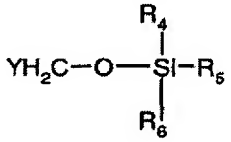
6. A ribonucleoside-derivative according to claim 5 wherein the substituent vicinal to the Si-atom comprises a substituted bivalent heteroatom.

7. A ribonucleoside-derivative according to claim 6 wherein the heteroatom is oxygen.

8. A method for the preparation of a ribonucleoside-derivative according to claim 1, comprising reacting a nucleoside with the formula



where R_1 and R_3 are as defined in claim 1, with a silyloxymethyiderivative of the formula



wherein Y is a suitable leaving group

and wherein R_4, R_5 and R_6 are independently alkyl or aryl or a combination of alkyl and aryl or a heteroatom, R_4, R_5 or R_6 may also be cyclically connected to each other.

9. The method of claim 8 wherein Y is a halogen.

10. The method of claim 8 ~~or 9~~ wherein R_4, R_5 and R_6 together comprise between 3 and 30 carbon atoms.

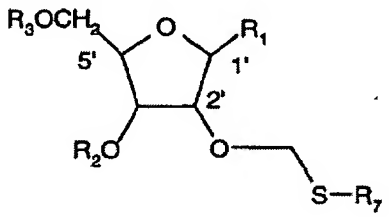
11. The method of claims 8 ~~or 9~~ wherein R_4, R_5 or R_6 comprise at least one substituted heteroatom vicinal to Si atom.

12. The method of claim 11 wherein the heteroatom is a bivalent atom.

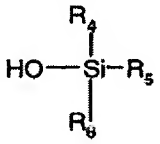
13. The method of claim 12 wherein the heteroatom is oxygen.

14. The method of claim 11~~, 12 or 13~~ wherein the ribonucleoside derivative is further substituted on the oxygen in 3'-position with a group comprising of a derivative of phosphoric acid.

15. A method for the preparation of a ribonucleoside-derivative, comprising reacting a ribonucleoside derivative with the formula



upon an electrophilic activation with a compound of formula:



wherein R_1 is defined as in claim 1 and R_7 is a alkyl- or aryl-group, or alkyl-aryl-group,
wherein R_2 is a protecting group,
wherein R_3 is a protecting group,
wherein R_4, R_5 and R_6 are identical or different alkyl or aryl or a combination of alkyl and aryl substituents, which my be further substituted with heteroatoms and which may also cyclically be connected to each other.

16. The method of claim 15 wherein R_4, R_5 and R_6 are defined as in claim~~s~~ 1~~ to 7~~.

17. The method of claim 15~~ or 16~~ wherein the ribonucleoside derivative is further substituted on the oxygen in 3'-position with a group comprising of a derivative of phosphoric acid.